

(3) Any claim put forward after the said period, will not be considered.

Thirthahalli Taluk.

Kasaba Hobli.

1. Alagere
2. Sarala
3. Yadehalli
4. Kocdlu

Agrahar Hobli.

1. Hulisale
2. Konanduru
3. Agalabagilu

Agumbe Hobli.

1. Megaravalli
2. Chakkadabylu
3. Thalluru
4. Malaluru
5. Kolagi

Muthuru Hobli.

1. Hedduaru
2. Holekoppa

S. NARAYANA RAO,
Deputy Commissioner.

CHIKMAGALUR REVENUE SUB-DIVISION.

Notification No. 4-36-37, dated 7th April 1937.

As the Barawardar patel of Dathathreyapeeta failed to enter upon his duties inspite of service of notice on him, the office is treated as vacant. Claimants if any, who are willing to enter upon the duties may establish their claim to the Pateli Office before the Amildar, Chikmagalur Taluk, within two years from the date of publication of this Notification, in the *Mysore Gazette*, failing which the Hak will be forfeited and the office disposed of according to rules.

Claims preferred after this period will not be considered.

R. V. SURAPPA,
Sub-Division Officer.

UNIVERSITY OF MYSORE

Notification No. 23014, dated 16th April 1937.

Ordinance 91 (page 67 of the Calendar for 1936-37, Volume I) is amended as under:—
Substitute the following for the third paragraph:—

"No candidate shall be declared to have passed the Master's Degree Examination unless he obtains not less than 40 per cent of the marks in the thesis when a thesis is offered, 40 per cent of the marks in the aggregate of the written papers, 40 per cent of the marks in the *Viva Voce* Examination and 50 per cent of the aggregate marks for the whole examination. Successful candidates who obtain 60 per cent of the total marks shall be placed in the first class in order of merit, and the other successful candidates in the second class in alphabetical order."

The Ordinance amended as above will read as under:—

"The examination for the degree of Master of Arts shall consist of four papers and *viva voce* examination, or a thesis and a *viva voce* examination; and the examination for the Degree of Master of Science shall consist of four papers and a *viva voce* examination, or two papers, a thesis and *viva voce* examination.

The written papers and the *viva voce* shall carry a maximum of 100 marks each, and the thesis shall carry a maximum of 400 marks in the case of the examination for the Master's Degree in Arts and 200 marks in the case of the examination for the Master's Degree in Science

No candidate shall be declared to have passed the Master's Degree Examination unless he obtains not less than 40 percent of the marks in the thesis when a thesis is offered, 40 per cent of the marks in the aggregate of the written papers, 40 per cent of the marks in the *viva voce* examination, and 50 per cent of the aggregate marks for the whole examination. Successful candidates who obtain 60 per cent of the total marks shall be placed in the first class in order of merit, and the other successful candidates in the second class in alphabetical order."

(Letter No. E. 3558—Uni. 80-35 32, dated the 9th April 1937, from the General Secretary to Government, Bangalore).

The revised Ordinance will have effect from the Examination of July 1938.

Notification No. 22862, dated 14th April 1937.

The following revised syllabuses in Mathematics for the Intermediate, B.A., and B.Sc. degree examinations are published for information.

Intermediate Examination in Arts. [Page 120 of Vol. I of the Calendar for 1936-37.]

(5) MATHEMATICS.

(a) Algebra.

Ratio and proportion. Variation. Theory of Indices. Logarithms and their application to arithmetical computation. Simple Surds. Quadratic equations. Theory of Quadratic Functions. Series in A.P., G.P. and H.P. Notion of convergence with illustrations from G.P. Summations involving $\sum n$, $\sum n^2$ and $\sum n^3$. Arithmetico-Geometric Series. Partial Fractions (elementary). Interest and Annuities; Permutations and Combinations. Binomial Theorem for a positive integral index and easy application of the theorem for any rational index. Easy Graphs. Solution of simultaneous quadratic equations. Indeterminate equations of the first degree.

(b) Trigonometry.

Measurement of angles. Trigonometric Functions and their relations to one another. Simple Equations. Solution of Triangles. Heights and Distances in one plane. Use of Trigonometric Tables. Sine and Cosine Graphs. Addition and Multiplication Formulæ. Properties of Triangles and Circles connected with them. Inverse Trigonometric Functions. Limits and Approximations. Heights and Distances in different planes. Application of Logarithms to Trigonometric computation.

(c) & (d) Geometry (Theoretical & Practical).

(i) THEOREMS IN PLANE GEOMETRY.

1. The rectangle contained by the diagonals of a cyclic quadrilateral is equal to the sum of the rectangles contained by its opposite sides.
2. The perpendiculars from the vertices of a triangle on the opposite sides meet in a point called the orthocentre, and the distance of each vertex from the orthocentre is twice the perpendicular distance of the circumcentre from the side opposite the vertex.
3. The three medians of a triangle meet in a point and this point is a point of trisection of each median and also of the line joining the circumcentre to the orthocentre.
4. The circle through the middle point of the sides of a triangle passes also through the feet of the perpendiculars of the triangle and through the middle points of the three straight lines joining the orthocentre to the vertices of the triangle.
5. If a perpendicular drawn from the vertex of a triangle is produced to meet the circumcircle, the distance of this point of intersection from the base is equal to the distance of the orthocentre of the triangle from the base.
6. The feet of the perpendiculars drawn on the sides of a triangle from any point on the circumcircle of the triangle are collinear.
7. Geometrical theorems corresponding to the following identities:—

$$\begin{aligned} K(a+b+c\dots) &= Ka + Kb + Kc\dots\dots \\ (a \pm b)^2 &= a^2 \pm 2ab + b^2. \\ a^2 - b^2 &= (a+b)(a-b). \\ (a+b)^2 - (a-b)^2 &= 4ab. \\ (a+b)^2 + (a-b)^2 &= 2(a^2 + b^2). \end{aligned}$$

8. The square on a side of a triangle is greater than, equal to or less than, the sum of the squares on the other two sides, according as the angle contained by these two sides is obtuse, right, or acute. The difference in the case of inequality is twice the rectangle contained by one of the two sides and the projection of it on the other.
9. If D is a point in the side BC of a triangle such that

$$\frac{1}{BD} = \frac{1}{BC},$$

n

$$\text{then } (n-1) AB^2 + AC^2 = n \cdot AD^2 + (1-\frac{1}{n}) BC^2.$$

10. If two chords of a circle cut one another, the rectangle contained by the segments of the one is equal to the rectangle contained by the segments of the other; and conversely,

if two straight lines cut one another so that the rectangle contained by the segments of the one is equal to the rectangle contained by the segments of the other, the four extremities of the straight lines are concyclic.

11. If from a point without a circle a secant and a tangent are drawn to the circle, the rectangle contained by the whole secant and its segment external to the circle is equal to the square on the tangent.

12. If from any point without a circle two straight lines are drawn one of which cuts the circle and the other meets it, and if the rectangle contained by the whole secant and its parts external to the circle equals the square on the line which meets the circle, this line is a tangent to the circle.

13. Definition and elementary theorems connecting antecedents and consequents.

14. A given straight line can be divided internally or externally in a given ratio at one and only one point.

15. A straight line drawn parallel to one side of a triangle cuts the other two sides produced (if necessary) proportionally; and the converse.

16. If the vertical angle of a triangle is bisected internally or externally, the bisector divides the base internally or externally into segments which have the same ratio as the other sides of the triangle; and the converse.

17. In equal circles, angles whether at the centres or at the circumferences, have the same ratio as the arcs on which they stand.

18. Triangles and parallelograms having equal altitudes are as their bases.

19. If two triangles are equiangular, their corresponding sides are proportional; and the converse.

20. If two triangles have one angle of the one equal to one angle of the other and the sides about the equal angles proportional, the triangles are similar.

21. Two triangles are similar, if the sides of the one are respectively parallel or perpendicular to the sides of the other.

22. If two triangles have two sides of the one proportional to two sides of the other and an angle in each opposite to one corresponding pair of these sides equal, the angles opposite to the other pair are either equal or supplementary.

23. If from the right angle A of a right-angled triangle ABC, AD is drawn perpendicular to BC, then (i) AD is the mean proportional between BD and DC; (ii) BA is the mean proportional between BD and BC; (iii) CA is the mean proportional between CD and CB.

24. If two triangles are similar, their corresponding lines (such as medians, altitudes, inradii, circumradii, etc.) are proportional.

25. If two triangles have one angle of the one equal to one angle of the other, their areas are proportional to the rectangles contained by the sides about these equal angles. Similarly for parallelograms having one angle of the one equal to one angle of the other.

26. Similar triangles are to one another as the squares on their corresponding sides.

27. Two similar polygons can be divided into the same number of similar triangles similarly placed; and the converse.

28. The perimeters of two similar polygons are to each other as their corresponding sides and their areas are proportional to the squares on corresponding sides.

29. In a right-angled triangle, any rectilineal figure described on the hypotenuse is equal to the sum of the similar and similarly described figures on the other two sides.

30. If four straight lines are proportional and a pair of similar rectilineal figures are similarly described on the first and the second and also a pair of similar rectilineal figures are similarly described on the third and the fourth, the figures are proportional.

31. If the vertical angle of a triangle is bisected internally by a straight line which cuts the base, the rectangle contained by the sides of the triangle equals the rectangle contained by the segments of the base together with the square on the straight line which bisects the angle.

32. If from the vertex angle of a triangle a straight line is drawn perpendicular to the base, the rectangle contained by the sides of the triangle equals the rectangle contained by the perpendicular and the diameter of its circumcircle.

(ii) SOLID GEOMETRY.

1. Any two straight lines which intersect each other, or are parallel, lie in a plane.
2. If a straight line is perpendicular to each of two intersecting straight lines at their point of intersection, it is perpendicular to the plane containing them.
3. If a straight line is perpendicular to each of three concurrent straight lines at their point of intersection, the three straight lines are in one plane.
4. Two straight lines perpendicular to the same plane are parallel; and the converse.
5. If two parallel planes are cut by a third plane, the lines of intersection are parallel.

6. If two straight lines are cut by parallel planes, they are cut proportionally.
7. If two intersecting planes are both perpendicular to a third plane, the common section of the first two is perpendicular to the third plane.
8. A straight line can be drawn perpendicular to each of two straight lines in space which do not intersect and are not parallel, and this straight line is the shortest distance between them.
9. If a solid angle is contained by three plane angles, any two of them are together greater than the third.
10. The plane angles which contain a solid angle are together less than four right angles.

(iii) PRACTICAL GEOMETRY.

Construction of the circumscribed, inscribed and escribed circles of a triangle. Medial section. Construction of regular polygons. Division of finite straight lines in a given ratio and construction of similar figures.

Construction of triangles from given data and division of triangles, quadrilaterals and polygons in a given ratio. Areas of polygons and problems relating thereto. Simple calculations relating to regular solids.

(iv) ANALYTICAL GEOMETRY.

Co-ordinates. Point dividing in a given ratio the join of two points. Centroid of the triangle in terms of the co-ordinates of the vertices. Distance between two points. Area of triangle in terms of the co-ordinates of the vertices. Loci and equations. The standard forms of the equation of the straight line. Angle between two given lines. Change of origin. Length of perpendicular from a given point on a given line. Bisectors of angles between two given lines. Simple locus problems on the straight line. Equation of the circle (Standard Forms).

(Rectangular axes are assumed throughout).

(e) Calculus.

Ideas of explicit and implicit functions. Graphs of simple functions. Limits. The differential co-efficient. Differentiation of algebraic and trigonometric functions (including circular functions). Application to rates, errors and approximations. Equations of tangent and normal. Subtangent and subnormal. Simple problems on Maxima and Minima. Integration. Standard Forms. Method of substitution. Integrations involving algebraic and trigonometric functions. Integration by parts. Definite integrals. Simple problems on areas.

Intermediate Examination in Science. [Page 131 of Vol. I of the Calendar for 1936-37.]

III. ELEMENTARY MATHEMATICS.

(For candidates for I.Sc. not taking Mathematics as an Optional subject).

1. Logarithms. Ratio and Proportion. Variation. Arithmetic and Geometric Progressions.
2. Co-ordinates. Graphs. The Straight Line and the Circle. Tracing of simple curves like the Parabola. Change of Origin.
Solution of equations graphically.
The graph of the quadratic function. Nature of the roots of the quadratic equation.
3. Application of the following theorems to numerical and graphical problems (the proofs of the theorems are not expected) :—
A straight line drawn parallel to one side of a triangle divides the other two sides proportionally and conversely. Equiangular triangles have their corresponding sides proportional and conversé.
Definition of similar polygons.
Two triangles are similar if two sides of one are proportional to two sides of the other, and the included angles are equal.
If a perpendicular be drawn from the vertex of a right-angle triangle on the hypotenuse, its length is a mean proportional between the segments into which the hypotenuse is divided.
Similar polygons can be divided into the same number of similar triangles.
The areas of similar polygons are proportional to the squares of their corresponding sides.
If two chords of a circle intersect at O, the rectangles contained by the segments of the chords are equal, and equal to the square of the tangent to the circle from O.

Construction for third and fourth proportionals. Mean proportional.

To draw a figure similar to a given figure on a side of given length.

4. Mensuration: Definition of a plane. Line perpendicular to a plane. Angle between two planes, two lines, a plane and a line. A plane is determined by three non-collinear points or by two intersecting (or parallel) lines.

Length of diagonal of cube or cuboid. Examples involving formulæ for area of surface and volume of the following solids: Prism, Pyramid, Cylinder, Cone, Sphere. (Proofs of the formulæ are not expected).

Great and small circles of a sphere. Latitude and Longitude.

5. Trigonometric functions. Radian measure. Heights and distances (problems involving right-angled triangles only in one plane). Graphs of trigonometric functions.

6. Statistics: Tabulation. Graphs. Averages. Measures of deviation. Correlation explained graphically. (Treatment with special reference to biological subjects is expected.)

IV. OPTIONAL MATHEMATICS.

PAPERS I AND II—Same as Mathematics for the Intermediate Examination in Arts.

PAPER III—Mechanics and Mensuration.

Mechanics.—

(Using Methods of Differential and Integral Calculus.)

1. Resolution and composition of Vectors.
2. Acceleration.
3. Newton's Laws of Motion.
4. Momentum, Energy, Work.
5. Forces acting at a point.
6. Parallel Forces; Moments.
7. Equilibrium of Co-planar Forces.
8. Centre of Gravity.
9. Simple Machines.

Mensuration.—

Length of a diagonal of cube or cuboid. Examples involving formulæ of surface and volume of the following solids: Prism, Pyramid, Cylinder, Cone, Sphere. Great and small circles of a sphere. Latitude and Longitude.

TEXT BOOKS.

(Elementary Mathematics).

1. Ross; Algebra, Part II.
2. Hall and Stevens: School Geometry, Parts IV—VI.
3. Hall and Knight: Trigonometry.
4. Statistics: by Bannister.

TEXT BOOKS.

(Optional Mathematics)

1. *Algebra*: Higher Algebra by V. B. Naik and V. A. Apte (Arya Bhushan Press, Poona).
2. *Trigonometry*: Plane Trigonometry: By B. B. Bagi (Published by B. B. Bagi, Reddy Housing Society, Dharwar).
3. *Plane Geometry*: Junior Geometry for Colleges by G. A. Srinivasan and C. Krishnamachari (Longmans).
4. *Solid Geometry*: Hall and Stevens: School Geometry, Part IV only.
5. *Analytical Geometry*: B. C. Maloney: Analytical Geometry.
6. *Calculus*: Introduction to Calculus: By V. M. Gaitonde (Bombay Book Depot, Girgaon, Bombay).
7. *Mensuration*: Pierpoint: Mensuration, Parts II and III.
8. *Dynamics*: School Mechanics by C. V. Durell—Parts I and II. (G. Bell and Sons.)

B.A. and B.Sc. [Page 164 of Vol. I of the Calendar for 1936-37.]

(i) PURE MATHEMATICS.

Analysis.

Ideas of rational irrational and complex numbers. Sequences. Limits. Addition Subtraction, Multiplication and Division theorems on limits of sequence. Monotonic sequences. Cauchy's Principle of Convergence (without proof). A monotonic sequence tends to a limit (examples and applications of the result only).

• Simple comparison tests for convergence and divergence of series. D'Alembert's and Raabe's Tests (in their simpler forms). Absolute convergence. Convergence of alternating series. Multiplication theorem for absolutely convergent series. The Binomial Theorem for rational index. Multinomial Theorem. Exponential and Logarithmic series (rigorous proof for the series for $\log(1+x)$ is not expected). Recurring series. Addition and multiplication theorems on determinants. Solution of simultaneous linear equations.

The fundamental relations between the roots of a polynomial equation and its co-efficients. Simple transformation of roots. Reciprocal equations. Simple properties of the roots $f(x) = 0$ and $f'(x) = 0$, and their mutual relations.

Functions of a single variable. Definition of continuity. Graphical study of properties of continuous functions. Differential co-efficients. Differentials. Differentiation of various functions. Successive differentiation. Leibnitz's theorem. First and Second mean value theorems of the differential calculus. Cauchy's Mean value theorem. L'Hospital's Rule. Taylor's theorem. Simple examples of expansions by Taylor's theorem, and by the formation of linear differential equations.

Subtangent. Subnormal. Curvature of plane curves. Cartesian, polar and (p.r.) formulæ. Circle of curvature. Involute and Evolute. Double points of plane curves. Maxima and Minima for functions of one variable. Points of inflexion. Simple examples on partial differentiation.

Integration. Methods of integration. Reduction formulæ. The definite integral as limit of a sum (introduced geometrically). Lengths and areas of plane curves. Volumes and surfaces of revolution. Theorems of Pappus.

The Argand diagram. Addition and Multiplication of complex numbers. De Moivre's Theorem for a rational index. Series for $\cos \theta$ and $\sin \theta$ in powers of θ (rigorous proof not expected). Expansion of $\tan(A+B+C\dots\dots\dots)$ in terms of $\tan A$, $\tan B$, etc. Expressions for $\cos n\theta$ and $\sin n\theta$ in terms of cosines and sines of multiples of θ . Definitions of circular functions for a complex variable. Hyperbolic Functions. Principal values of the inverse circular and hyperbolic functions. Logarithm of a complex number. Simple examples of separation of real and imaginary parts. Gregory's series. Simple series for π .

Geometry.

I. PURE GEOMETRY.

Properties of circles. Pole and Polar. Coaxial Circles. Inversion. Elementary notions about projection, cross-ratios and harmonic division. Harmonic property of pole and polar of circle. The quadrilateral and quadrangle. Their harmonic properties. The property of collinearity of the middle points of the diagonals of a quadrilateral.

II. PLANE ANALYTICAL GEOMETRY.

Straight Lines. The Circle, Coaxial Circles. The conic sections referred to their principal axes. Tangent, pole and polar chord with given middle point, pair of tangents from a point, Centre, asymptotes and axes of a conic given by the general Cartesian equation of the second degree. Tracing of conic sections. Polar equations of the straight line, circle and conic.

III. SOLID GEOMETRY.

Direction cosines, angle between two straight lines. The equation of the plane. Distance of a point from a plane. Equations of a straight line. Distance of a point from a straight line. Condition for coplanarity of two lines. Shortest distance between two lines in space.

(ii) Applied Mathematics.

Dynamics, Statics and Astronomy.

1. *Dynamics*: Addition of vectors. Angular velocity and acceleration. Areal velocity and acceleration. Relative velocity. Newton's laws of Motion. Work and Energy. Conservation of Energy and Momentum. Units and Dimensions. Motion in a straight line, under constant acceleration. Projectiles under gravity. Collision of elastic bodies. Simple harmonic motion. Combination of S.H.M.'s Tangential and Normal acceleration. The simple and conical pendulums. Motion in a vertical circle.

2. *Statics*: Moments and Couples. Conditions of equilibrium of a rigid body under coplanar forces. Laws of Friction. Problems on centre of gravity using methods of the Calculus. Stable and unstable equilibrium. The simple Catenary.

3. *Astronomy*: The celestial sphere. Celestial co-ordinates. The Earth and its rotation. Foucault's pendulum.

The transit instrument. The Equatorial. The Sextant.

The ecliptic. Apparent path of the sun at different latitudes. Length of day. Seasons. Twilight.

Sidereal Time. Apparent and Mean time. Conversion of time. Equation of Time (rough graphical study only). Date line. The calendar. Determination of geographical longitude.

Planets: Kepler's Laws. Phases of planets. Direct and Retrograde motion. Sidereal and Synodic periods. Comets and Meteors. The Moon. Phases and period. The Harvest Moon. Eclipses of the Sun and the Moon.

Atmospheric Refraction: Geocentric Parallax. Annual Parallax. Distances of Sun, Moon and Stars from the Earth. Precession, Nutation and Aberration: Stars and their classification. Variable and Binary Stars. Apparent and Absolute Magnitudes. Clusters and Nebulae. Proper motions of Stars.

General Statistics and applications of Mathematics to Economics and Mental and Social Measurements.

- (1) Collection and classification of statistics.
- (2) Graphical representation of numerical data.
- (3) Calculation of central tendencies and of measures of scatter.
- (4) Linear and parabolic curve fitting. Method of least squares.
- (5) Measurement of relationship between two variables. Product-moment method of determining correlation co-efficient.
- (6) Elementary problems of sampling. (Advanced properties of the normal probability curve will not be required).
- (7) Expressions for utility and marginal utility. Bernoullian hypothesis. Subjective price and consumer's surplus.
- (8) Curves of demand and supply. Alterations in price and output for given changes in condition of supply and demand. Numerical measures of elasticity.
- (9) Efficiency of money. Increasing, constant and decreasing returns. Curves of integral and marginal supply. Effects of a small tax or bounty on production.
- (10) Conditions of monopolistic production. Compromise benefit and consumers' combinations.
- (11) Essentials of mental measurement. Weber's and Fechner's laws.
- (12) Constants of mental measurement. Their reliability measures.

TEXT BOOKS.

RELEVANT PORTIONS OF THE FOLLOWING BOOKS.

1. Milne: Higher Algebra.
2. Osgood: First Course in Differential and Integral Calculus (Macmillan Company, New York).
3. Siddons & Hughes: Trigonometry, Parts III-IV (Cambridge University Press).
4. Askwith: Pure Geometry.
5. Loney: The Elements of Co-ordinate Geometry. Part I.
6. Bell: Co-ordinate Geometry of Three Dimensions.
7. Norris and Legge: Mechanics via the Calculus.
8. H. Subramania Iyer: A text book of Astronomy (Chitra Publishing House, Trivandrum).
9. Statistics: Caradog Jones: A First Course in Statistics.
10. Mathematical Economics: A. T. Bowley: Groundwork of Mathematical Economics.
11. Mental and Social Measurements: Thompson; Essentials of Mental Measurements.

(Letter No. E. 3537—Uni. 80-36-30, dated the 8th April 1937, from the General Secretary to the Government, Bangalore.)

Notification No. 22844, dated 14th April 1937.

The following detailed syllabuses in "Indian Ethics" under Social Philosophy and "Psychology of Religion" under Psychology, for the B.A. Honours Degree Examination in Philosophy (pages 195 and 204 of the Calendar for 1936-37, Volume I) are published for information.

INDIAN ETHICS.

- I. Nature and scope of *dharma* as conceived in the various systems. Its relation to morality. Early moral notions like *rta* and *Satya*. Classification of *dharma*s into
 - (i) *Sadharana* or those common to all; Life of Virtues.
 - (ii) *Visesha* or those relative to particular *varnas* or classes of society and *asramas* or stages of life.

Aim and significance of the classification. Morality of Indian Social Institutions. *Nitya*, *naimittika*, *pratishiddha* and *kamyā karmas*. Source of knowledge of *dharma*.

- (1) Revelation (*sruti*) View of *Vidhi* as (i) a divine command and (ii) an impersonal imperative.
- (2) Intuition of sages (*yogi-pratyaksha*).
- (3) Practices of the wise (*sishtachara*).
- (4) Reason.

II. Metaphysical background of Indian Ethics. Conception of the individual or Jiva as a transmigrating personality. Origin and history of the Karma doctrine. Its ethical basis, Free-will and Determinism. *Samsara* and moral order.

III. Interrelation of cognition, feeling and conation. Voluntary and other forms of activity. The object of moral judgment. Analysis of will. Springs of action according to the different systems. Reason and moral action.

IV. Standard of moral judgment:

- (1) Standard as Right (*Karyā*): Prabhakara's view of *niyoga* and *apurva*. Duty for duty's sake.
- (2) Standard as Good (*ishita*)—(i) End as present pleasure (*preyas*). Egoistic hedonism of the Charvaka. Natural and political sanctions the only deterrents. (ii) End mainly as pleasure in a future life (*svarga*). Eudæmonism of the Bhattas. (iii) End as self-realisation (*moksha*) through self-conquest. Place of asceticism in Indian Ethics. Jainā and Buddhistic schemes of discipline. Value of the doctrine of *ahimsa* or non-injury. Ideal of Bodhisattva. *Yama* and *niyamā*. *Nish-kama-karma* as taught in the Gita. Importance of the teaching in the history of Hindu Ethics. *Loka-sangraha*. Bhakti in relation to ethical conduct. Different views of self-realisation.

V. The place of morality in the Indian scheme of life.

Books recommended for consultation:—

1. E. W. Hopkins: Ethics of India.
2. S. K. Maitra: Ethics of the Hindus.

PSYCHOLOGY OF RELIGION.

PART I: INTRODUCTORY—

1. Introduction: Some objections to the study of Psychology of Religion considered. The scope of the subject and methods of study. The Psychological Standpoint.

2. Definition of Religion: The difficulty of defining Religion. Universal characteristics of Religion: Objective and Subjective characteristics. Institutional and Personal Religion.

3. A brief survey of the development of religion:

- (a) *Origins of Religion*: As an outgrowth of uncertainty—as a reaction to natural forces—as a product of metaphysical interests. Psychological sources of Primitive Religions. Origin of Religion no test of its validity.
- (b) Belief in God and Immortality. Causes of disbelief and doubt.

4. *Cult Practice*: As an outlet to emotional life and æsthetic interests. Psychology of religious sects. Group worship. Reverence for sacred symbols. Music and chanting. Sacrifices and offerings. Crowd Psychology and revivals. The qualifications of a preacher. The value of preaching.

5. Psychological Principles: Instincts—Development of Sentiment. Conscience. The Unconscious. Conflicts. The mechanisms of transference, projection and sublimation. The divided self. Suggestibility. Psychology of belief, doubt, insight, intuition, illusion, hallucination, and errors in reasoning. Logic of the unconscious mind.

PART II: THE DEVELOPMENT OF RELIGION IN THE INDIVIDUAL—

A. The Normal.

1. The religious development of the Child.
2. The religious development of the adolescent. Characteristic difficulties; (a) disposition to doubt; (b) tendency to be dogmatic, (c) excessive emotionality.
3. The normal religious development of the adult: The affective, rational and moral elements.
4. Prayer and Worship: The prompting to prayer. The objects of the prayer. The efficacy of prayer. The interpretation of prayer. Objective and subjective worship.

B. The Exceptional.

1. *Conversion*: As an awakening. Pre-conversion states. The conversion states. Types of conversion. Factors at work in conversion.

2. *Saintliness*: Characteristic of (a) peace of mind, (b) charity, (c) fortitude and (d) purity of life.

Asceticism: Chastity, poverty and obedience. The sense of sin.

3. *Mysticism*: Description and classification. Favourable conditions for the occurrence of mystic experience. The ecstasy. The value of the mystic findings. The place of mysticism.

4. *Pathology of Religion*:—Psycho-analysis and Religion. Pathological conversions. Sadistic components.

PART III—CONCLUSION—

1. Summary of Religious Characteristics. Uneasiness and deliverance. Meaning and purpose of Religion:

2. Religion and Morality. Religion and the State. Religion and Science.

3. The Future of Religion.

TEXT-BOOKS RECOMMENDED FOR STUDY.

1. Josey C. C.: The Psychology of Religion (Macmillan).

2. Pratt J. B.: The Religious Consciousness (Macmillan).

BOOKS RECOMMENDED FOR REFERENCE.

1. Thouless R. H.: An Introduction to the Psychology of Religion (pp. 102-186).

2. Ames E. S.: The Psychology of Religious Experience (pp. 33-116).

3. James W.: Varieties of Religious Experience (pp. 259-429).

4. Sante De Sanctis: Religious Conversion (pp. 27-127).

5. Leuba J. H.: Psychology of Religious Mysticism (pp. 1-46 and 191-299).

Letter No. E. 3546—Uni. 80-36-29, dated the 8th April 1937, from the General Secretary to Government, Bangalore.

Notification No. 23129, dated 19th April 1937.

Ordinance 93 (page 68 of the Calendar for 1936-37, Volume I) is amended as under:—

Add the following as note 2 under the Ordinance:

Note 2—The course in respect of "Methods" under group A and of, "Practice in Teaching" under group B shall comprise—

(1) the teaching of English;

(2) the teaching of one of the following subjects: History, Geography, Mathematics, Science.

(Letter No. E. 3538—Uni. 80-36-31, dated the 8th April 1937, from the General Secretary to Government, Bangalore.)

By Order,

V. GOPALASWAMI AIENGAR,
Registrar.

MEDICAL SCHOOL, BANGALORE.

Notification No. 1798, dated 9th April 1937.

Applications for admission into the L.M.P. Class will be received up to Saturday the 5th of June 1937, by the Principal, in the specified form of application and accompanied by a Deposit fee of Rs. 5. For further particulars see pages 552, 54, Part III—2 of the *Mysore Gazette*, dated the 8th April 1937.

B. K. NABAYANA RAO,
Principal.